

CIDEA Antibody (C-term) Blocking peptide
Synthetic peptide
Catalog # BP14057b**Specification**

CIDEA Antibody (C-term) Blocking peptide - Product InformationPrimary Accession [O60543](#)**CIDEA Antibody (C-term) Blocking peptide - Additional Information****Gene ID** 1149**Other Names**

Cell death activator CIDE-A, Cell death-inducing DFFA-like effector A, CIDEA

Target/Specificity

The synthetic peptide sequence used to generate the antibody AP14057b was selected from the C-term region of CIDEA. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

CIDEA Antibody (C-term) Blocking peptide - Protein Information**Name** CIDEA {ECO:0000303|PubMed:18509062, ECO:0000312|HGNC:HGNC:1976}**Function**

Lipid transferase that promotes unilocular lipid droplet formation by mediating lipid droplet fusion (PubMed:19843876, PubMed:26118629). Lipid droplet fusion promotes their enlargement, restricting lipolysis and favoring lipid storage (PubMed:19843876). Localizes on the lipid droplet surface, at focal contact sites between lipid droplets, and mediates atypical lipid droplet fusion by promoting directional net neutral lipid transfer from the smaller to larger lipid droplets (By similarity). The transfer direction may be driven by the internal pressure difference between the contacting lipid droplet pair and occurs at a lower rate than that promoted by CIDEA (By similarity). May also act as a CEBPB coactivator in epithelial cells to control the expression of a subset of CEBPB downstream target genes, including ID2, IGF1, PRLR, SOCS1, SOCS3, XDH, but not casein (By similarity). By interacting with CEBPB, strengthens the association of CEBPB with the XDH promoter, increases histone acetylation and dissociates HDAC1 from the

promoter (By similarity). When overexpressed, induces apoptosis; the physiological significance of its role in apoptosis is unclear (By similarity).

Cellular Location

Lipid droplet. Nucleus {ECO:0000250|UniProtKB:O70302}. Note=Enriched at lipid droplet contact sites.

Tissue Location

Expressed in omental and subcutaneous adipose tissue (at protein level).

CIDEA Antibody (C-term) Blocking peptide - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Blocking Peptides](#)

CIDEA Antibody (C-term) Blocking peptide - Images**CIDEA Antibody (C-term) Blocking peptide - Background**

This gene encodes the homolog of the mouse protein Cidea that has been shown to activate apoptosis. This activation of apoptosis is inhibited by the DNA fragmentation factor DFF45 but not by caspase inhibitors. Mice that lack functional Cidea have higher metabolic rates, higher lipolysis in brown adipose tissue and higher core body temperatures when subjected to cold. These mice are also resistant to diet-induced obesity and diabetes. This suggests that in mice this gene product plays a role in thermogenesis and lipolysis. Alternatively spliced transcripts have been identified.

CIDEA Antibody (C-term) Blocking peptide - References

Li, F., et al. FEBS J. 277(20):4173-4183(2010) Ito, M., et al. J. Lipid Res. 51(7):1676-1684(2010) Huang, Y.W., et al. Gynecol. Oncol. 117(2):239-247(2010) Laurencikiene, J., et al. Cancer Res. 68(22):9247-9254(2008) Valouskova, E., et al. Gen. Physiol. Biophys. 27(2):92-100(2008)